

REMARKS

In the Office Action, claims 5 and 7-10 are rejected under 35 U.S.C. §103(a) as being unpatentable over Okamoto et al. in view of Sharp, claims 5-10 are rejected under 35 U.S.C. §103(a) as being unpatentable over Okamoto et al. in view of Kobayashi et al., and claims 1-4 are rejected under 35 U.S.C. §103(a) as being unpatentable over Okamoto et al. in view of O'Connor et al.

The gist of the instant invention is to provide a method of casting surface treatment on the surface of a carbon nanotube field emission display (CNT-FED) to increase the number of carbon nanotubes exposed on the surface of the CNT-FED. The casting surface treatment includes the steps of coating an adhesive material on the surface of the CNT-FED, heating the adhesive material for adhibitting the surface, and lifting the adhesive material off. **The step of lifting adhesive material off can remove the impurities and increase the number of carbon nanotubes exposed on the triode structure.**

In the detailed office action, the examiner rejects claims 5 and 7-10 by citing Okamoto et al. as having disclosed an adhesive sheet which is brought into contact with a CNT film, pressed to activate the adhesion and adhibitted to the CNT film. The adhesive sheet is then **lifted off to cause the CNTs on the surface to be pulled into an upright alignment state.** The examiner admits that Okamoto et al. do not teach coating an activator but cites Sharp as having taught that application of activator to a surface prior to a pressure-sensitive adhesive tape. Applicants respectfully contend that the rejection is unwarranted because the subject matter taught by both Okamoto et al. and Sharp are

different from the instant invention based on the following analysis and comparison.

As pointed out above, the gist of the instant invention resides on “**removing impurities**” on the surface of the CNT-FED by lifting the adhesive material off to increase the number of carbon nanotubes exposed on a triode structure. In contrast, Okamoto et al. teach **pulling the CNTs on the surface into an upright alignment state**. It is very clear that two methods are different, and Okamoto et al. neither teach the steps **coating an activator on the surface** before coating an adhesive material nor suggest **removing impurities on the surface of CNG-FED**.

With regards to the activator taught in paragraph [0005] of Sharp, this activator will cause the **adhesive tape to stick very strongly** to the body part when it has had an opportunity to cure (lines 6-9). In other words, the purpose of the activator taught by Sharp is to strongly adhere the tape to **avoid being easily removed or lifted**. It would not be logical for a person skilled in the art to combine the teaching of Sharp with Okamoto et al. **because the adhesive sheet of Okamoto is to be lifted off**. In contrast to the teaching of Sharp, the activator 311 of the instant invention is used to **prevent too closely sticky between the adhesive material 313 and dielectric layer 305 in the gate hole** (page 7, lines 11 to page 8, line 1 of the instant invention). Evidently, the activator of the instant invention has to be completely different from the teaching of Sharp.

In response to the office action, claim 5 is amended to include the step of “**removing impurities on the surface of said CNT-FED by lifting said adhesive material off**”. From the above discussion, claim 5 should have overcome the rejection under 35 U.S.C. §103(a) over Okamoto et al. in view of Sharp. Furthermore, because

Kobayashi et al. do not teach “removing impurities on the surface of a CNT-FED” either, the amended claim 5 should also be allowable over Okamoto et al. in view of Kobayashi et al. By virtue of dependency, claims 6-10 should be allowable as well.

In the detailed action, the examiner further rejects claims 1-4 by citing Okamoto et al. in view of O’connor et al. For the same reason discussed above, Okamoto et al. only teach using adhesive sheet for **pulling the CNTs on the surface into an upright alignment state**. The subject matter of the instant invention as defined in claim 1 is also to remove impurities on the surface of the CNT-FED. Accordingly, claim 1 is amended to include the step of “**removing impurities on the surface of said CNT-FED by lifting said adhesive material off**”. Applicants respectfully submit that the amended claim 1 should be allowable because neither Okamoto nor O’connor teaches the subject matter of removing impurities. By virtue of dependency, claims 3-4 should be allowable as well.

From the foregoing discussion, applicants have presented clear evidence that the instant invention differs from the cited prior arts. The amended claims 1-10 are in full condition for allowance. The specification has been amended to correct a few editorial and grammatical errors. Prompt and favorable reconsideration of the application is respectfully solicited.

Respectfully submitted,

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